

 Invasive Alien Species  
"IAS"  
Management in Saint Lucia  
and Caribbean Partner Countries



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### What are Invasive Alien Species?

*IAS are plants, animals or micro-organisms that are not native to a specific ecosystem and whose introduction threatens biodiversity, food security, health or economic development.*

- **Invasive:** they harm other species and/or take over their habitats
- **Alien:** Exotic, not native; they arrive without the natural enemies (e.g. predators) they had at home
- Often pioneer species: adaptable and prolific



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### Impact of Invasive Alien Species

*The global cost of IAS is estimated at US\$1.4 trillion per year (nearly 5% GDP) – and rising in times of globalization and climate change*



African vervet monkey

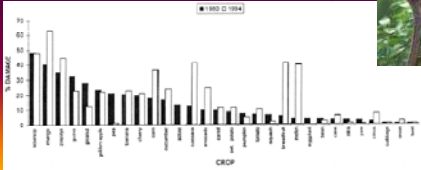


Fig. 8. The mean percentage damage by vervet monkeys to 30 crops in Senegal in 1983 and 1994.

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### Some Damaging IAS in Saint Lucia



Giant African Snail



Indian mongoose



Feral pigs



Water hyacinth



Varroa mite

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### Importance of Caribbean Biodiversity

- Caribbean biodiversity hotspot & UN Special Area
- High level of endemism
- Ramsar and UNESCO World heritage sites
- Ecosystems provide services, food security and support vital industries, e.g. agriculture, fisheries, tourism
- Global connectivity, especially of marine ecosystems



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### Vulnerability of Caribbean Biodiversity

- Complexity of region: physical, geographical, political, social & economical
- Multiplicity of pathways for IAS introduction: Trade, Transport, Travel and Tourism ('the infamous four Ts')
- Below critical mass breeding sites and populations
- Inadequate capacity and linkages between key stakeholders



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## “Mitigating the Threats of Invasive Alien Species in the Insular Caribbean”

### Goal

Conserve globally important ecosystems, the species and genetic diversity within the insular Caribbean

### Objective

Mitigate the threat to local biodiversity and economy by IAS in the insular Caribbean, including terrestrial, freshwater and marine ecosystems




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## Components of GEF-funded Project

- C1: Development of a National Invasive Species Strategy (NISS)
- C2: Establishment of regional, Caribbean- wide cooperation and invasive species strategy (CIAS)
- C3: Knowledge management and sharing
- C4: Prevention of new IAS Introductions in Terrestrial, Freshwater and Marine Systems; St. Lucia: Savannes Bay / Maria Islands
- C5: Early Detection, Rapid Response and Control of IAS Impacts; St. Lucia: alien iguana eradication in the Soufriere area




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## Pilot Countries and Projects throughout Region

	Bahamas	Dominican Republic	Jamaica	Trinidad & Tobago
Component 4 (Prevention)	-	-	-	Frost pod rot of cocoa
Component 5 (Control)	Lionfish	Alto Velo Cabritos	Goat Island Lionfish	Red palm mite Green mussel




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### Development of NISS in Saint Lucia

- NISS Team prepared thematic analyses as stand-alone reports to inform NISS:
  - ↳ Aquatic and terrestrial ecosystems
  - ↳ Prioritization of high risk pathways
  - ↳ Capacity-building needs, public awareness
  - ↳ Policy gaps and needs






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### Regional, Caribbean-wide Cooperation and Invasive Alien Species Strategy (CIAS)

- Participate fully in relevant regional and global IAS for a, e.g. CARICOM, CISWG, GLISPA, GloBallast, OECS, UNEP CEP, etc.
- Regional consultation on CIAS by ecosystem approach (terrestrial, marine, freshwater)
- Saint Lucia to lead cooperation in OECS and Creole-speaking Eastern Caribbean



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### Knowledge Management and Sharing

- Design national public education campaign based on awareness survey
- Input into regional Communication, Education & Public Awareness (CEPA) Plan
- Electronic IAS networks:
  - <http://www.saintlucianplants.com>
  - [Carib\\_IAS\\_Threat@YahooGroups.com](mailto:Carib_IAS_Threat@YahooGroups.com)
  - <http://www.ciasnet.org>
- Establish linkages with global databases:
  - Alien iguana profile submitted to GISD
  - IABIN I3N training completed



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### IAS Prevention in Savannes Bay / Maria Island Nature Reserve



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### IAS Prevention in Maria Island Nature Reserve / Savannes Bay

- Aims to conserve critical species, such as endemic Saint Lucia whiptail and Saint Lucian racer
- Prevent re-introduction of predators to off-shore islands in order to preserve metapopulations
- Demarcate Maria Islands Marine Reserve
- Marine monitoring beyond pilot site: private sector involved



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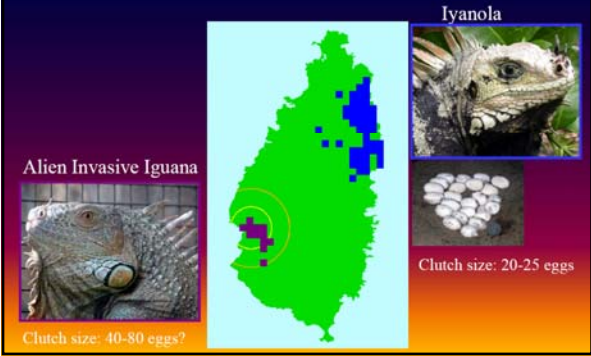
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### Early Detection and Eradication of Alien Invasive Iguana



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## Early Detection and Eradication of Alien Iguana (Component 5)

Diversify capture approaches:

- intensified visual search
- revised trapping grid
- sniffer dogs?



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## Invasive Species – relax if you can !



Thank you !

- Direction Régionale de l'Environnement (DIREN) for invitation
- GEF, Government of Saint Lucia, DWCT, and other local and regional collaborators



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